

# IEEE MetroCon 2023 Conference Program

## 35th Annual IEEE FW Conference #59008

November 2, 2023, 7:00am to 7:00pm  
Hurst Conference Center, Hurst, TX

NOTE: Registration Desk opens at 7:00am. HCC Opens for exhibits load-in and setup at 6:00am.

Time	Gallery in Front of Salon A/B  Student Posters Chair: Michael Bishop Co-Chair: TBD	Meeting Room 1  Internet of Things Track Chair: Ed Hightower Co-Chair: Prabha Sundaravadivel	Meeting Room 3  Software and Systems Engineering Track Chair: Michelle Maddox Co-Chairs: Juanita Winfrey	Meeting Room H-G  Developing and Deploying Secure Systems Track Chair: Phillip Todd Co-Chairs: Princy Mehta	Meeting Room E-F  Power and Energy Track Chair: Derrick Webster Co Chair: Allison McMahon	Meeting Room 4  Computational Intelligence Track Chair: Colleen Bailey Co-Chair:	Meeting Room Board Room (Upstairs)  Biotechnologies Chair: Hongli Wu Co-Chairs: Eul Hyun	Meeting Room 2  Autonomous and Vehicle Systems Chair: Chris Elliot Co-Chair: James Hogan	Meeting Room 5  Photonics Chair: Catrina Coleman Co-Chair: Isabelle Smith	Meeting Room 6  Engineering and Financial Planning Chair: Brian Wronko Co-Chair: David Sandhu	Salon B  Exhibits Schedule Chair: Gerry Ourada Co-Chair: Jim Thompson
7:30	Put up Posters	Welcome Address Mike Bishop, IEEE MetroCon 2023 General Chair									Set up start at 6am
7:45 - 8:25		Plenary Address -- SALON A: Dr. Jeff Daniels, Peter Adejokun, and Ben Amaba - Securing the Software Supply Chain for our Future as Professionals – Readiness and Interoperability									
8:30 -- 9:25	Put up Posters	Empowering Autonomous Vehicles... Song Fu, Associate Chair for Research Department of Computer Science & Engineering, UNT	Planning for a Sustainable Future – Considerations for Influencing Our Future Casey Medina, Studio SE	CyberCyber Resiliency, everything you need to know can be learned from American Football Teresa Merklin Lockheed Martin	HVDC Converter Technology Solutions Marianne Goldsborough Burns and McDonnell	The Dark Side of Machine Learning: The Importance of Ethics OSCAR Lab UNT	Photodynamic Therapy – New Challenges and Strategies Wei Cheng, Ph.D. UTA	Aerostructure Flexure Estimation (AFE) Technology Development Bryan Bell Lockheed Martin	Laser Detection and Ranging (LADAR) & Overview of IR Technology and IR Sensor Modeling Glenn Goranson & Billy Maloof	The 3 Stages of College Planning Melissa Cox, CFP CFLSA Fetterman Investments	Exhibits Program
9:25 -- 9:55	Students Present Posters during Break	Break in Exhibits Area (Salon B)									
10:00 -- 10:55		Unlocking the Software Defined Vehicle for Defense Innovation Rich DesMarais, Regional Sales Manager BlackBerry	ARCOS: Automated Rapid Certification of Software: Changing How Software Certification is Accomplished Stephen Traub, Adrian Edwards Lockheed Martin	Post Quantum Computing And Cybersecurity WHY NOW Chris Wood Lockheed Martin	EV Fleet Integration Jennifer Williams Deaton Oncor	Tensor Methods for Efficient Deep Learning Panos Markopoulos, PhD UTSA	Antioxidant Small Molecules that Target Disease Kayla N. Green, Ph.D. TCU	Fly by Objective Mike Skaff Lockheed Martin	Directed Energy RDT&E within the Texas A&M University System Dr. James Creel Texas A&M	Retirement Planning Bill Swoboda, AAMS	
11:00 -- 11:55	Poster Judging  Students Present to Judges	Beyond Hyperscalers Samy Fodil, Founder & CEO/CTO at Taubyte	Overcoming Modeling Standards & Conventions to Maximize Reuse: Integrating Disparate System Models Kadheem Cohen, Christine Van Hoeven Lockheed Martin	Cybersecurity: The Hidden Driver of Innovation and Enablement Bryce Carter City of Arlington	Voltage on the Rise: Shunt reactor switching needs attention! Sudarshan Byreddy Burns and McDonnell	Mitigating Unintended Consequences in Multi-Agent Reinforcement Learning Garrett Hall Southwest Research Institute	Magnetic Resonance imaging of metabolic alterations in disease Eul Hyun (Christine) Suh, Ph.D. UNTHSC	The e-Pilot: Even Great Pilots Need a Cognitive Boost Keith Higginbotham	Light-matter interactions in transition metal dichalcogenides and perovskites for sensors and solar cells Anupama Kaul, UNT	Countdown To Retirement: The 10 Critical Years Before You Retire David Sandu CRCP	
12:00 -- 1:15	Poster Awards	Luncheon Program -- SALON A: Keynote Address: William Hurley, Strangeworks CEO, Quantum and AI Fact vs. Fiction and a Little Speculation Student Poster Competition Awards									Lunch Break with Conference
1:15 -- 2:00		Networking in Exhibits Area (Salon B)									Exhibits Program  Exhibit Program ends All exhibitors invited to Reception
2:00 -- 3:10	Students display/present winning posters  Take down Posters	Applications and Benefits of Artificial Intelligence/Machine Learning Algorithms for IoT, IIoT, Smart Everything... Hariteja Bodepudi, Infosys Limited	Overcoming the Secrecy Challenge: Innovating in a Secret World Tina Srivastavar Badge, Inc, MIT	DevSecOps – AI Security versus AI Malware. Today's Digital Battlefield Dr. Ben Amaba, Dr. Jeff Daniels, Cate Richards, Ademola Adejokun Lockheed Martin and Sonatype	Oncor's Solar Incentive Program Chris Cook Oncor	Panel Discussion Humanitarian Projects Morgan Kiani TCU	Novel Stem Cell Approach for Treating Hard-to-Heal Soft Tissue Injury Liping Tang, Ph.D. UTA	A Capability-Centric Roadmap for Applying Dual-Use 21st Century Technology Steve Lincoln Lockheed Martin	NEXT LEVEL TESTING: Raytheon's Approach to Directed Energy Critical Qualification During Integration Jason R Lavine	Updates on engineering and surveying ethics and Code of Conduct, Board And statutory changes, and general updates on Board Initiatives Rick Strong	
3:10 -- 3:40		Break in Exhibits Area (Salon B)									
3:45 -- 4:40		Computer Vision in IoT Frameworks: Challenges, Methods, and Applications Prabha Sundaravadivel,UT Tyler	Benefits of Employing an Agile Coach with Your Agile Transformation Journey Steve Lincoln Lockheed Martin	Cyber Threat Brief US Secret Service	Asset Performance Management: The Unified Strategy Tony Trim Eaton	Empirical Report on Quantum Optimization (QuOPT) application For Avionics Routing problems Ademola Adejokun Lockheed Martin	Reversing the Clock: Unlocking the Key to Aging by Targeting the Glutaredoxin System Hongli Wu, Ph.D. UNTHSC	Automated Optical Scanning for Manufactured Part Inspection Gregory Port Lockheed Martin	Electromagnetic metamaterials: Principles and applications Robert Magnusson UTA	Engineer Your Legacy: Uncovering 3 Tax & Legacy Blindspots David Sandu CRCP	Exhibits Tear Down begins right after break -- Exhibitors invited to Reception
4:45 - 6:00	Reception Program -- SALON A										

IEEE MetroCon 2023 is Sponsored by the IEEE Fort Worth Section